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| APPLICATION NO.                                   | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|-------------|----------------------|---------------------|------------------|
| 10/617,656  | 07/14/2003  | Philippe Bouiller    | 240112US6           | 4735             |
| 22850   | 7590        | 03/21/2005           | EXAMINER            |                  |
| OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT, P.C. |             |                      | KIM, TAE JUN        |                  |
| 1940 DUKE STREET                                  |             |                      | ART UNIT            |                  |
| ALEXANDRIA, VA 22314                              |             |                      | PAPER NUMBER        |                  |

3746

DATE MAILED: 03/21/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

SP

**Office Action Summary**

Application No.

10/617,656

Applicant(s)

BOUILLER ET AL.

Examiner

Ted Kim

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 08 February 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) 9 and 11-13 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-8, 10, 14 and 15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 07/14/2003.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

### DETAILED ACTION

1. Claims 9, 11-13 are withdrawn from further consideration pursuant to 37 CFR 1.142(b) as being drawn to a nonelected species, there being no allowable generic or linking claim. Election was made **without** traverse in the reply filed on 02/08/2005.

#### *Drawings*

2. The drawings are objected to because in Figure 5, the motor is lacking element numbers for the rotor 42, stator 43, casing 35, and shrouds 61, 62 (see page 11). A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

#### *Claim Rejections - 35 USC § 112*

3. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5. Claims 1-8, 10, 14, 15 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

- Claim 1, last line, "said accessory" lacks proper antecedent basis and there is nothing in the claims specifying the relationship between the accessory and the fuel or oil pump.

***Claim Rejections - 35 USC § 102***

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

7. Claims 1-4 are rejected under 35 U.S.C. 102(b) as being anticipated by Hambling (2,949,731). Hambling teaches a system for driving a fuel pump 13 or an oil pump 14 in a turboengine 1-5, said system comprising an electric motor 11 presenting a stator and a rotor (inherent components of an electric motor), the system further comprising an air turbine 6 presenting a casing and a rotary assembly; said air turbine being suitable for being fed by a flow of air taken from a compressor 1 of said turboengine in order to contribute to driving said accessory; a control valve 15 for controlling the flow of air taken from the compressor, which control valve is in a closed position while the turboengine is starting and in an open position once it has started (col. 1, lines 68+); the flow of air taken from the compressor is sufficient to enable the pump to be operated by the air turbine in the absence of electrical power supply or in the event of said electric motor failing; wherein the air turbine lies on the same axis as said electric motor; the system constitutes a complete module that is ready for mounting and easy to replace.

8. Claims 1-4 are rejected under 35 U.S.C. 102(b) as being anticipated by Williams (5,899,085). Williams teaches a system [for driving a fuel pump or an oil pump in a turboengine is intended use], said system comprising an electric motor 104 presenting a stator and a rotor (inherent components in an electric motor), the system further comprising an air turbine 42 presenting a casing and a rotary assembly; said air turbine being suitable for being fed by a flow of air 40 taken from a compressor 18 of said turboengine in order to contribute to driving said accessory 80; a control valve 44 for controlling the flow of air taken from the compressor, which control valve is in a closed position while the turboengine is starting and in an open position once it has started; the flow of air taken from the compressor is sufficient to enable the pump to be operated by the air turbine in the absence of electrical power supply or in the event of said electric motor failing (col. 5, lines 37+); wherein the air turbine lies on the same axis as said electric motor; the system constitutes a complete module that is ready for mounting and easy to replace.

***Claim Rejections - 35 USC § 103***

9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

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10. Claims 1-4, 14, 15 are rejected under 35 U.S.C. 103(a) as being unpatentable over either Hambling (2,949,731) or Williams (5,899,085). Hambling and Williams teach various aspects of the claimed invention but does not teach the use of a gear pump or the engine being an all-electric turboengine. The use of gear pumps on aircrafts is old and well known in the art for its reliability and the engine being an "all-electric engine" is admitted prior art. It would have been obvious to one of ordinary skill in the art to employ a gear pump, as a well known and reliable design conventionally used in aircraft turboengines. As for the engine being all-electric turboengines, it would have been obvious to employ this type as an admitted prior art type engine that requires power to drive the accessories/pumps. As for Williams, Williams teaches an accessory but not a oil or fuel pump. However, it would have been obvious to also drive a fuel or oil pump, in Williams, as suggested by Hambling, as the air turbine/ electric motors are shown driving multiple accessories.

11. Claims 5-7 are rejected under 35 U.S.C. 103(a) as being obvious over any of the above prior art and further in view of Wollenweber et al (6,145,314). The prior art teach various aspects of the claimed invention but do not teach the stator of said electric motor is integrated in the casing of said air turbine, and the rotor of said electric motor is integrated in the rotary assembly. Wollenweber teach a motor/turbine arrangement where the stator of said electric motor 94 is integrated in the casing 89 of said turbine, and the rotor 80 of said electric motor is integrated in the rotary assembly 82, 83; the rotor of the electric motor is mounted on a wall 82a of the rotary assembly, and the stator 94 is

mounted on a wall of the casing 89. Upon combination with the prior art, the rotary assembly includes a shaft mechanically coupled to the accessory and supported by bearings 97, 88 interposed between said shaft 98 and the casing 89. It would have been obvious to one of ordinary skill in the art to employ the motor/turbine structure/housing structure taught by Wollenweber et al, in order to employ an integrated motor/turbine/housing structure used in the art for its simplicity.

*Allowable Subject Matter*

12. Claims 8, 10 would be allowable if rewritten or amended to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action and if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

*Contact Information*


Any inquiry concerning this communication or earlier communications from the Examiner should be directed to Ted Kim whose telephone number is 571-272-4829. The Examiner can be reached on regular business hours before 5:00 pm, Monday to Thursday and every other Friday.

The fax numbers for the organization where this application is assigned are 703-872-9306 for Regular faxes and 703-872-9306 for After Final faxes.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Cheryl Tyler, can be reached on 571-272-4834.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist of Technology Center 3700, whose telephone number is 703-308-0861. General inquiries can also be directed to the Patents Assistance Center whose telephone number is 800-786-9199. Furthermore, a variety of online resources are available at <http://www.uspto.gov/main/patents.htm>

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